Vitrectomy Eye Surgery

Delivering the best in care

UHB is a no smoking Trust

To see all of our current patient information leaflets please visit www.uhb.nhs.uk/patient-information-leaflets.htm
Vitreous
The vitreous is normally a clear, jelly-like fluid that fills the inside of the eye. Various disease states can cause the vitreous to cloud, fill with blood or even harden so that light entering the eye will be misdirected and not reach the retina properly.

The Eye

Vitreous fluid

Vitrectomy
A vitrectomy is a surgical procedure that removes the vitreous in the central cavity of the eye so the retina can be operated on and vision can be corrected. It is beneficial in many disease states including diabetic eye disease, vitreous haemorrhage, retinal detachments, macular holes, epiretinal membrane and following complications of cataract surgery.

The procedure
The vitrectomy procedure is normally performed as an outpatient procedure. Rarely, an overnight stay in the hospital is required.
Local or general (while you are asleep) anaesthesia may be used. The eyelid will be held opened using a special speculum and the eye that is not being operated on will be covered. You will not be able to see any of the procedure.

The procedure begins by making 3 tiny incisions in the white part of the eye and connecting an infusion line to maintain constant eye pressure. Next, a light source and microscopic cutting device are inserted which will gently remove the vitreous fluid.

The surgeon will use a microscope to view the eye whilst performing the procedure.

After the vitreous is removed the surgeon will perform any retinal surgery that is required and then refill the eye with one of the following substitutes depending on your condition:

1. Saline solution that closely resembles the natural vitreous fluid in your eye
2. Gas to keep the retina flat (this will absorb over 2-6 weeks)
3. Silicone oil (this usually requires removal with surgery 3 months later)

An antibiotic to prevent infection will be given at the end of the procedure.

Your procedure may take between 30 minutes and 2 hours, depending on its complexity.

Vitrectomy risks

Vitrectomies have been commonly performed and perfected for over 30 years. However, certain risks do exist. They include:
- Cataract formation or progression
- Retinal detachment
- Raised pressure in the eye
- Bleeding inside the eye
- Infection
- Blindness or loss of eye (extremely rare)
- Need for additional treatment and/or surgery

What to expect after vitrectomy

Expect your eye to be sensitive, red and swollen due to the nature of the surgery.

If gas has been inserted into the vitreous chamber, your vision will be poor until the bubble gradually absorbs.

The most important factor determining your rate of recovery and final outcome is the pre-operative condition for which the vitrectomy was performed. Your surgeon can advise you what to expect.

You will be prescribed a combination of drops to administer on your discharge home.
Postoperative instructions

Since vitrectomy is often performed along with other procedures, postoperative instructions may vary.

Some general guidelines are provided however, please consult with your surgeon for specific instructions.

1. If gas or oil has been inserted into the eye, you will be advised how to position your head. This helps ensure that the gas or oil is in contact with the affected retina, in order to encourage healing. You may be advised to maintain this position for up to 45 minutes of every hour for 3-7 days.

2. No flying with gas in the eye (2-6 weeks). The reduced atmospheric pressure causes the gas bubble to expand, which can raise the pressure in the eye to dangerous levels.

3. Begin using any anti-inflammatory and antibiotic drops prescribed by your physician immediately after your eye patch has been removed.

4. Take simple analgesia to relieve mild discomfort.

5. Wear the plastic eye shield when sleeping for the first 7 days following surgery.

6. Avoid strenuous activity for one week (unless directed otherwise by your physician).

If you develop a deep headache or throbbing pain that does not respond to over-the-counter painkillers, you should contact the Ophthalmology Department immediately.

The Ophthalmology Department is open between 09:00-16:30, Monday-Friday. Alternatively visit the Emergency Department (A&E) urgently.

If you have any queries please do not hesitate to contact the Ophthalmology Department on 0121 371 6476.
Please use the space below to write down any questions you may have and bring this with you to your next appointment.
The Trust provides free monthly health talks on a variety of medical conditions and treatments. For more information visit www.uhb.nhs.uk/health-talks.htm or call 0121 371 4323.

Ophthalmology Department
Area 1, Level 0
Queen Elizabeth Hospital Birmingham
Mindelsohn Way, Edgbaston
Birmingham, B15 2GW
Telephone: 0121 371 6476

Birmingham and Midland Eye Centre:
(Out-of-hours)
Sandwell and West Birmingham Hospitals NHS Trust,
Dudley Road, Birmingham, B18 7QH
Telephone: 0121 554 3801 ask for Birmingham and Midland Eye Centre